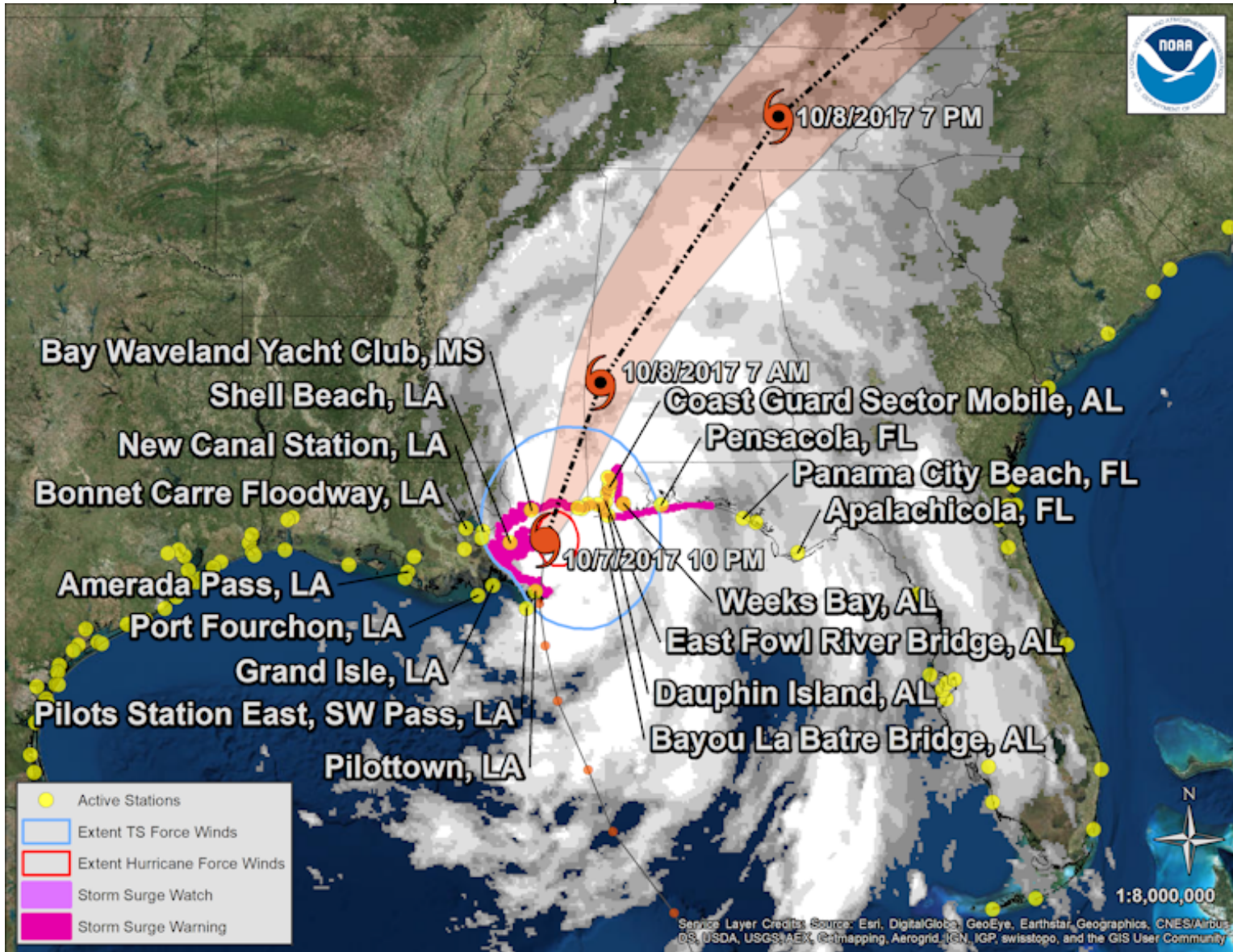




Hurricane NATE QuickLook  
Posted: 23:00 CDT 10/07/2017

#### NOAA and NOAA Partnership Stations Relative to the Storm



#### Storm Analysis

##### NATE'S NORTHERN EYEWALL MOVING ONSHORE THE MISSISSIPPI COAST

As of 10/07/2017 23:00 CDT, water levels along the Gulf Coast from Amerada Pass, LA to Apalachicola, FL are either rising or remain elevated. Water levels from Shell Beach, LA to Apalachicola, FL including within Mobile Bay range between 2.2 and 4.8 feet above normal tide levels with the highest water levels observed at Shell Beach, LA.

Water levels within Lake Ponchartrain and along far southeastern Louisiana range from 2.5 to 3.0 feet above tidal predictions. West of where Nate made initial landfall near the mouth of the Mississippi River, water levels range from 1.5 to 2.0 feet above tidal predictions.

Winds from Shell Beach, LA to Dauphin Island, AL range from 25 to 40 knots with gusts of 35 to 45 knots. Barometric pressure has bottomed out in extreme southeastern Louisiana but continues to fall elsewhere across the region.

Water Level and Meteorological plots available below are updated automatically. A line denoting Mean Higher High Water (MHHW) is displayed to provide an approximate indication of when flooding inundation may occur.

For additional data, please see the [Center for Operational Oceanographic Products & Services](#) website. For more information or archived products and reports, please see the [Storm QuickLook](#) Homepage.

Analyst: PFF

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SELECT NATIONAL HURRICANE CENTER ADVISORY INFORMATION: Hurricane Nate Advisory Number 15  
NWS National Hurricane Center Miami FL AL162017  
1000 PM CDT Sat Oct 07 2017

...NATE'S NORTHERN EYEWALL MOVING ONSHORE THE MISSISSIPPI COAST...

SUMMARY OF 1000 PM CDT...0300 UTC...INFORMATION

-----  
LOCATION...29.9N 89.1W  
ABOUT 35 MI...60 KM SSW OF BILOXI MISSISSIPPI  
ABOUT 60 MI...95 KM E OF NEW ORLEANS LOUISIANA  
MAXIMUM SUSTAINED WINDS...85 MPH...140 KM/H  
PRESENT MOVEMENT...N OR 360 DEGREES AT 20 MPH...31 KM/H  
MINIMUM CENTRAL PRESSURE...984 MB...29.06 INCHES

WATCHES AND WARNINGS

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CHANGES WITH THIS ADVISORY:

The Storm Surge Warning has been discontinued from Grand Isle Louisiana to the Mouth of the Mississippi River and for Lake Pontchartrain.

The Hurricane Warning from Grand Isle Louisiana to the mouth of the Pearl River has been changed to a Tropical Storm Warning.

The Hurricane Watch from the Alabama/Florida border to the Okaloosa/ Walton County Line has been discontinued.

The Tropical Storm Warning has been discontinued west of Grand Isle.

SUMMARY OF WATCHES AND WARNINGS IN EFFECT:

A Hurricane Warning is in effect for...

\* Mouth of the Pearl River to the Alabama/Florida border

A Storm Surge Warning is in effect for...

- \* Mouth of the Mississippi River to the Okaloosa/Walton County Line Florida

A Tropical Storm Warning is in effect for...

- \* Metropolitan New Orleans and Lake Pontchartrain

- \* Lake Maurepas

- \* Grand Isle Louisiana to the Mouth of the Pearl River

- \* East of the Alabama/Florida border to Indian Pass Florida

A Hurricane Warning means that hurricane conditions are expected somewhere within the warning area. Preparations to protect life and property should be complete.

A Storm Surge Warning means there is a danger of life-threatening inundation, from rising water moving inland from the coastline in the indicated locations. For a depiction of areas at risk, please see the National Weather Service Storm Surge Watch/Warning Graphic, available at [hurricanes.gov](http://hurricanes.gov). This is a life-threatening situation. Persons located within these areas should take all necessary actions to protect life and property from rising water and the potential for other dangerous conditions. Promptly follow evacuation and other instructions from local officials.

A Tropical Storm Warning means that tropical storm conditions are expected somewhere within the warning area.

For storm information specific to your area, including possible inland watches and warnings, please monitor products issued by your local National Weather Service forecast office.

## DISCUSSION AND 48-HOUR OUTLOOK

At 1000 PM CDT (0300 UTC), the center of Hurricane Nate was located by an Air Force Reserve Hurricane Hunter aircraft and NOAA Doppler radar just offshore of the Mississippi coast near latitude 29.9 North, longitude 89.1 West. Nate is moving toward the north near 20 mph (31 km/h). A turn toward the north-northeast and northeast with an increase in forward speed is expected during the next couple of days. On the forecast track, Nate's center will make landfall on the Mississippi coast within the next hour or two. After landfall, the center of Nate is expected to move across the Deep South, Tennessee Valley, and central Appalachian Mountains through Monday.

Data from the reconnaissance aircraft indicate that maximum sustained winds are near 85 mph (140 km/h) with higher gusts. Nate is expected to weaken quickly after landfall, and it is likely to become a tropical storm Sunday morning. It should degenerate into a remnant low late Monday.

Hurricane-force winds extend outward up to 35 miles (55 km) from the center, and tropical-storm-force winds extend outward up to 125 miles (205 km).

The minimum central pressure based on aircraft data is 984 mb (29.06 inches).

A water level of 4.4 ft Mean Higher High Water (MHHW) was recently reported by a National Ocean Service gauge at Shell Beach, Louisiana. The gauge at Bay Waveland Yacht Club, Mississippi, recently reported a water level of 3.3 ft MHHW.

## HAZARDS AFFECTING LAND

WIND: Hurricane and tropical storm conditions are expected in the hurricane warning area overnight. Tropical storm conditions are expected in the tropical storm warning area through Sunday morning.

**STORM SURGE:** The combination of a dangerous storm surge and the tide will cause normally dry areas near the coast to be flooded by rising waters moving inland from the shoreline. The water is expected to reach the following heights above ground if the peak surge occurs at the time of high tide...

Mouth of the Pearl River to the Mississippi/Alabama border...7 to 11 ft  
Mississippi/Alabama border to the Alabama/Florida border, including Mobile Bay...6 to 9 ft  
Mouth of the Mississippi River to the mouth of the Pearl River...5 to 8 ft  
Alabama/Florida border to the Okaloosa/Walton County Line...4 to 6 ft  
Morgan City, Louisiana to the mouth of the Mississippi River...1 to 3 ft  
Okaloosa/Walton County Line to Indian Pass, Florida...2 to 3 ft  
Indian Pass to Crystal River, Florida...1 to 3 ft

The deepest water will occur along the immediate coast near and to the east of the landfall location, where the surge will be accompanied by large and destructive waves. Surge-related flooding depends on the relative timing of the surge and the tidal cycle, and can vary greatly over short distances. For information specific to your area, please see products issued by your local National Weather Service forecast office.

**RAINFALL:** Nate is expected to produce the following rain accumulations through Monday:

Western Cuba: additional 1 to 2 inches.

East of the Mississippi River from the central Gulf Coast into the Deep South, eastern Tennessee Valley, and southern Appalachians: 3 to 6 inches, max 10 inches.

Across the Ohio Valley into the central Appalachians: 2 to 5 inches, max 7 inches.

**TORNADOES:** A few tornadoes are possible across parts of Alabama, the western Florida Panhandle, western Georgia, and southern Mississippi through Sunday afternoon.

**SURF:** Swells generated by Nate will affect land areas around the Gulf of Mexico during the next day or so. These swells are likely to cause life-threatening surf and rip current conditions. Please consult products from your local weather office.

#### NEXT ADVISORY

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Next intermediate advisory at 100 AM CDT.

Next complete advisory at 400 AM CDT.

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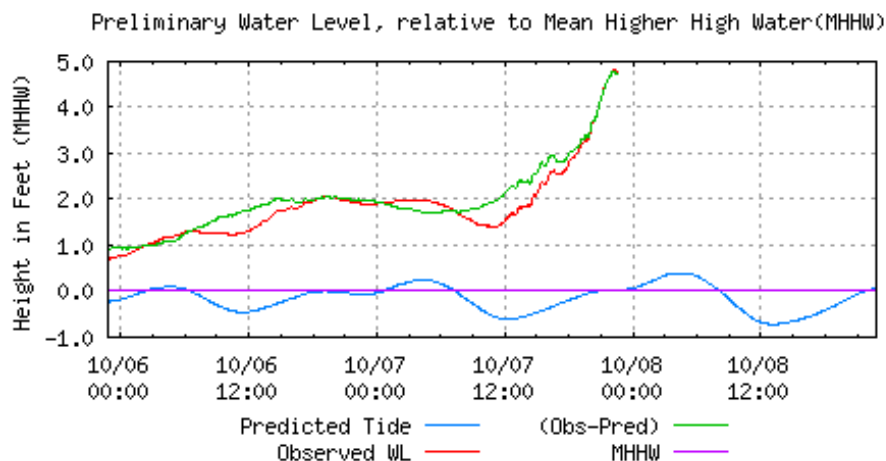
Forecaster Berg

For the purpose of timely release, data contained within this QuickLook have undergone a "limited" NOS Quality Assurance/Control; however, the data have not yet undergone final verification. All data subject to NOS verification.

Jump to: [Shell Beach - Water Level](#), [Shell Beach - Winds](#), [Shell Beach - Barometric](#), [Bay Waveland Yacht Club - Water Level](#), [Bay Waveland Yacht Club - Winds](#), [Bayou La Batre Bridge - Water Level](#), [Dauphin Island - Water](#)

Level, Dauphin Island - Winds, Dauphin Island - Barometric, East Fowl River Bridge - Water Level, Coast Guard Sector Mobile - Water Level, Coast Guard Sector Mobile - Winds, Weeks Bay, Mobile Bay - Water Level, Pensacola - Water Level, Pensacola - Barometric, Panama City Beach - Water Level, Panama City Beach - Winds, Apalachicola - Water Level, Apalachicola - Winds, New Canal Station - Water Level, New Canal Station - Winds, I-10 Bonnet Carre Floodway - Water Level, Pilots Station East, SW Pass - Water Level, Pilots Station East, SW Pass - Winds, Pilots Station East, SW Pass - Barometric, Pilottown - Water Level, Pilottown - Winds, Grand Isle - Water Level, Grand Isle - Winds, Port Fourchon, Belle Pass - Water Level, LAWMA, Amerada Pass - Water Level, LAWMA, Amerada Pass - Winds

# NOAA/NOS/CO-OPS 8761305 Shell Beach, LA



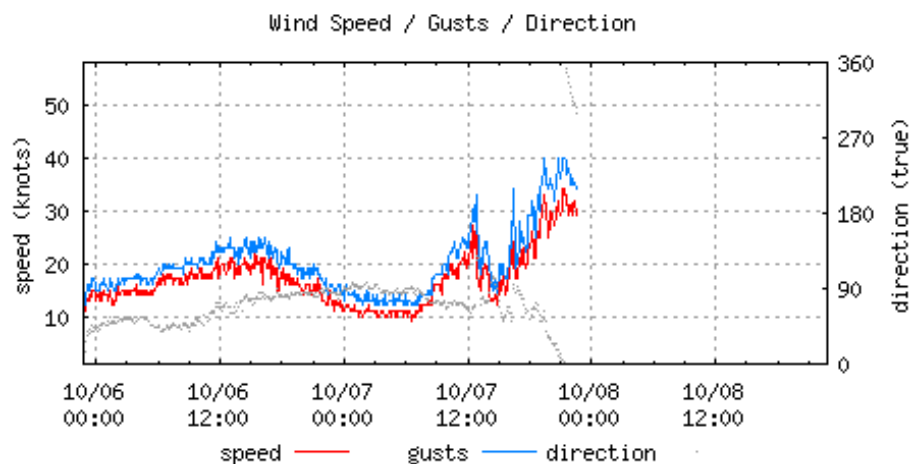
Last Observed Sample: 10/07/2017 22:42 (CDT). Data relative to MHHW

Observed: 4.74 ft. Predicted: 0.03 ft. Residual: 4.71 ft.

Historical Maximum Water Level: Aug 29 2012, 9.45 ft.

Next High Tide: 10/08/2017 04:29 (CDT), 0.40 ft.

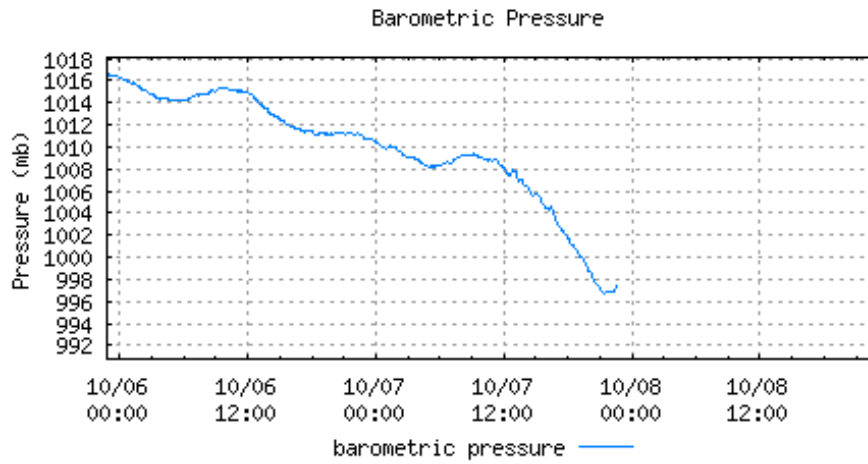
# NOAA/NOS/CO-OPS 8761305 Shell Beach, LA



Last Observed Sample: 10/07/2017 22:42 (CDT)

Wind Speed: 30 knots Gusts: 34 knots Direction: 299° T

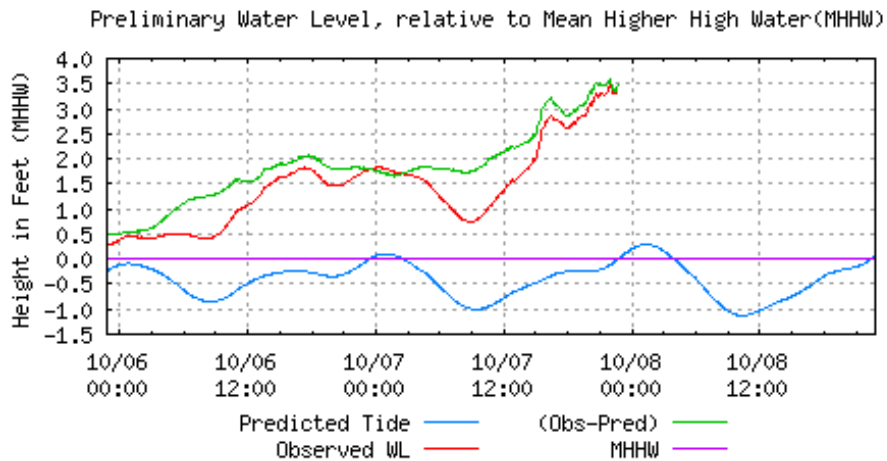
NOAA/NOS/CO-OPS 8761305 Shell Beach, LA



Last Observed Sample: 10/07/2017 22:42 (CDT)

Barometric Pressure: 997.3 mb

NOAA/NOS/CO-OPS 8747437 Bay Waveland Yacht Club, MS



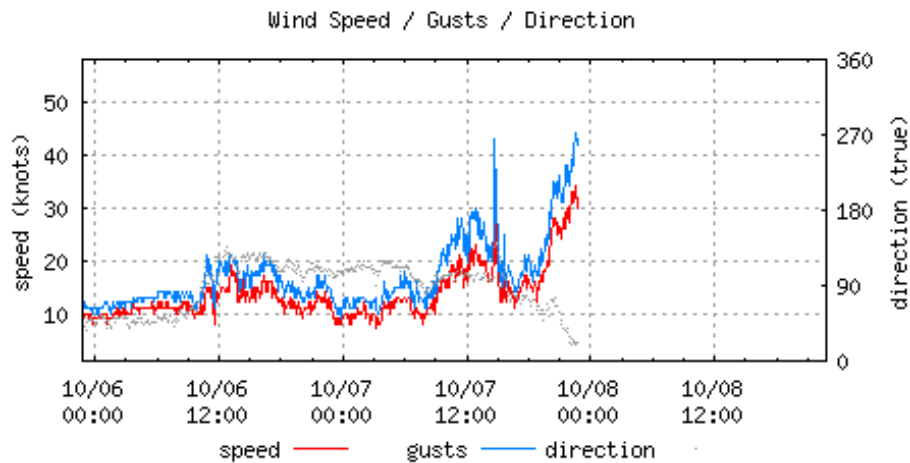
Last Observed Sample: 10/07/2017 22:42 (CDT). Data relative to MHHW

Observed: 3.47 ft. Predicted: 0.00 ft. Residual: 3.47 ft.

Historical Maximum Water Level: Sep 1 2008, 9.10 ft.

Next High Tide: 10/08/2017 01:20 (CDT), 0.29 ft.

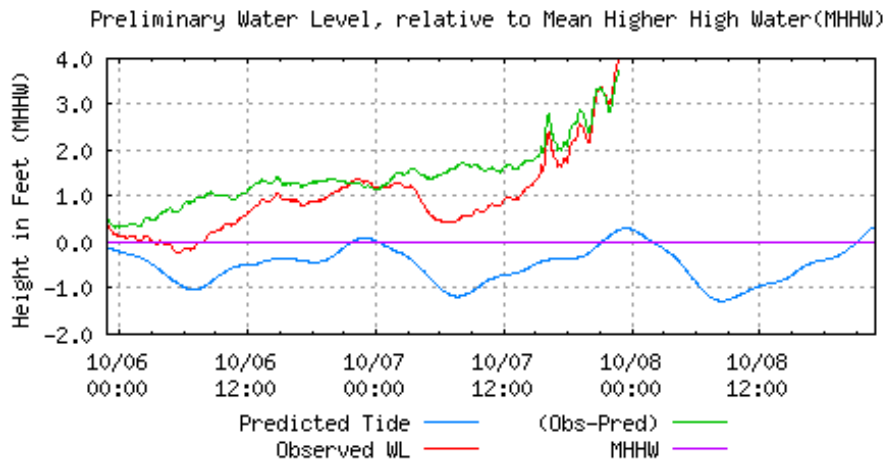
NOAA/NOS/CO-OPS 8747437 Bay Waveland Yacht Club, MS



Last Observed Sample: 10/07/2017 22:42 (CDT)

Wind Speed: 30 knots Gusts: 42 knots Direction: 22° T

NOAA/NOS/CO-OPS 8739803 Bayou La Batre Bridge, AL



Last Observed Sample: 10/07/2017 22:48 (CDT). Data relative to MHHW

Observed: 3.99 ft. Predicted: 0.27 ft. Residual: 3.72 ft.

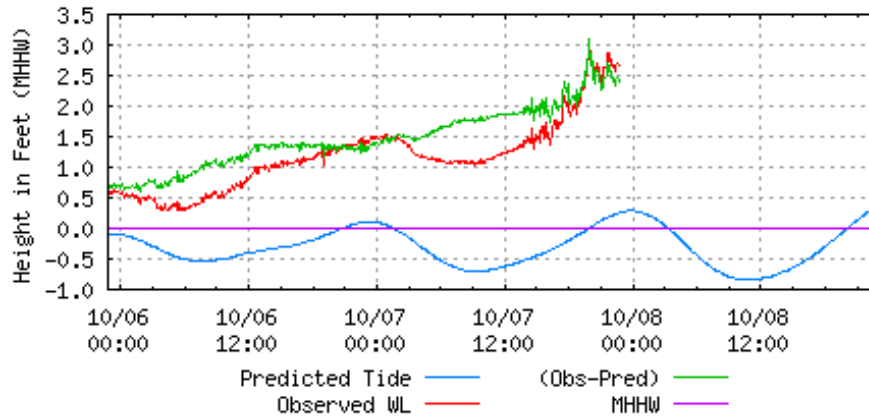
Historical Maximum Water Level: n/a

Next High Tide: 10/07/2017 23:28 (CDT), 0.29 ft.



NOAA/NOS/CO-OPS 8735180 Dauphin Island, AL

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 10/07/2017 22:42 (CDT). Data relative to MHHW

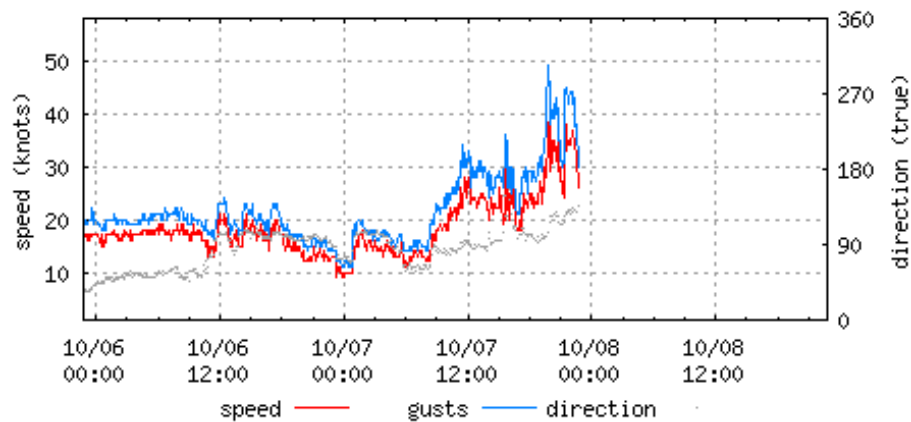
Observed: 2.67 ft. Predicted: 0.26 ft. Residual: 2.41 ft.

Historical Maximum Water Level: Sep 16 2004, 5.94 ft.

Next High Tide: 10/07/2017 23:50 (CDT), 0.28 ft.

NOAA/NOS/CO-OPS 8735180 Dauphin Island, AL

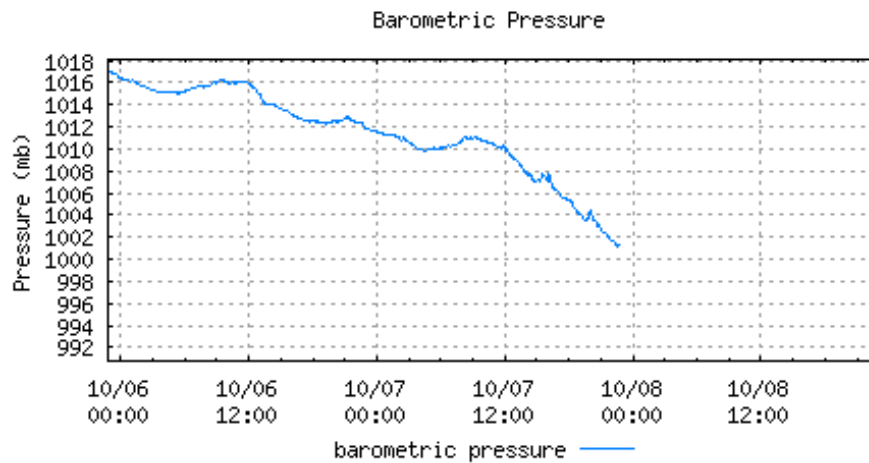
Wind Speed / Gusts / Direction



Last Observed Sample: 10/07/2017 22:42 (CDT)

Wind Speed: 26 knots Gusts: 30 knots Direction: 137° T

NOAA/NOS/CO-OPS 8735180 Dauphin Island, AL

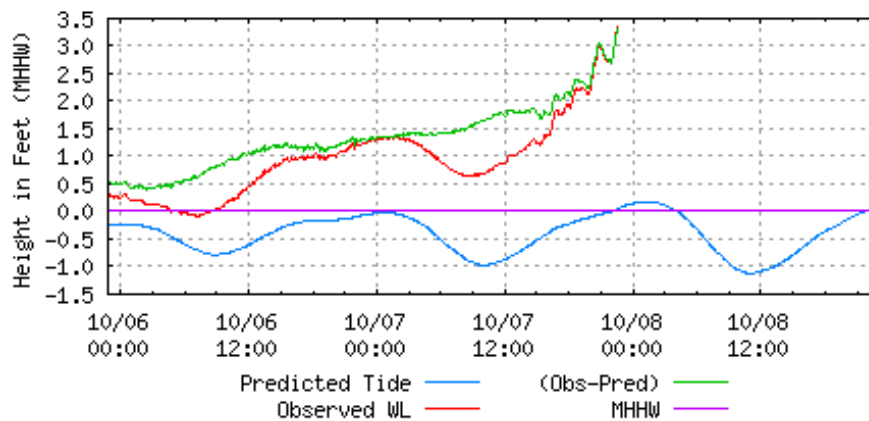


Last Observed Sample: 10/07/2017 22:42 (CDT)

Barometric Pressure: 1001.3 mb

NOAA/NOS/CO-OPS 8735523 East Fowl River Bridge, AL

Preliminary Water Level, relative to Mean Higher High Water (MHHW)



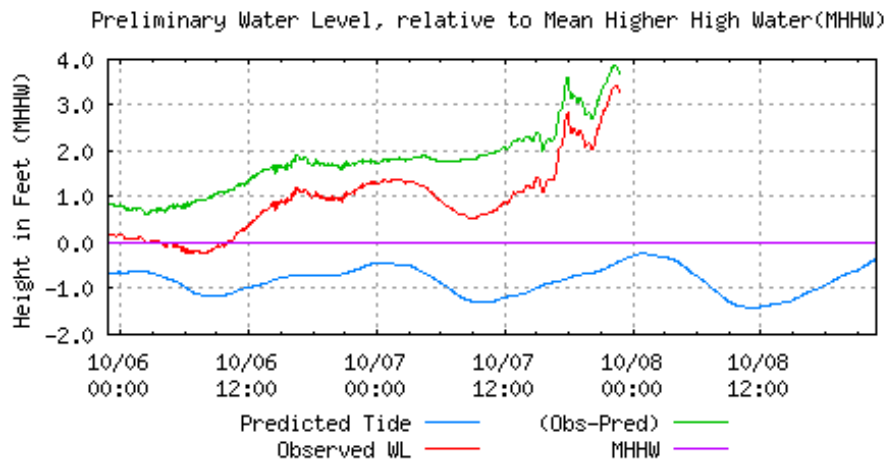
Last Observed Sample: 10/07/2017 22:42 (CDT). Data relative to MHHW

Observed: 3.37 ft. Predicted: 0.06 ft. Residual: 3.31 ft.

Historical Maximum Water Level: Aug 29 2012, 3.75 ft.

Next High Tide: 10/08/2017 01:14 (CDT), 0.18 ft.

NOAA/NOS/CO-OPS 8736897 Coast Guard Sector Mobile, AL



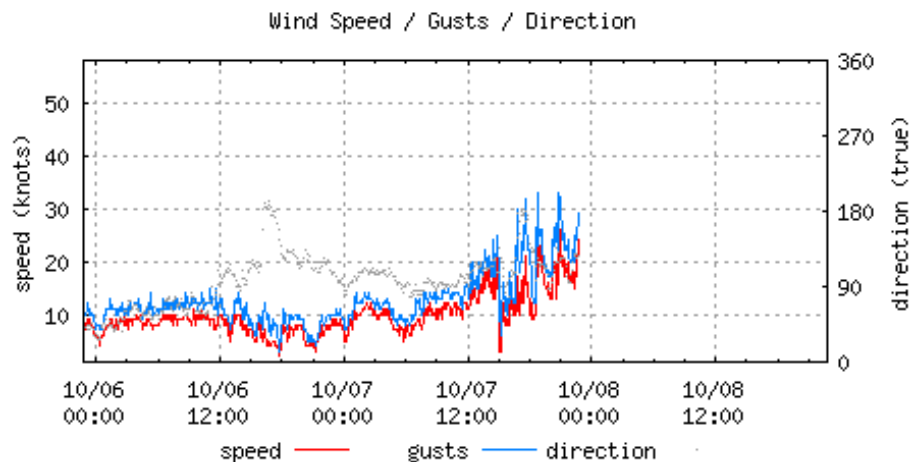
Last Observed Sample: 10/07/2017 22:48 (CDT). Data relative to MHHW

Observed: 3.16 ft. Predicted: -0.40 ft. Residual: 3.56 ft.

Historical Maximum Water Level: Sep 1 2008, 3.80 ft.

Next High Tide: 10/08/2017 00:56 (CDT), -0.24 ft.

NOAA/NOS/CO-OPS 8736897 Coast Guard Sector Mobile, AL

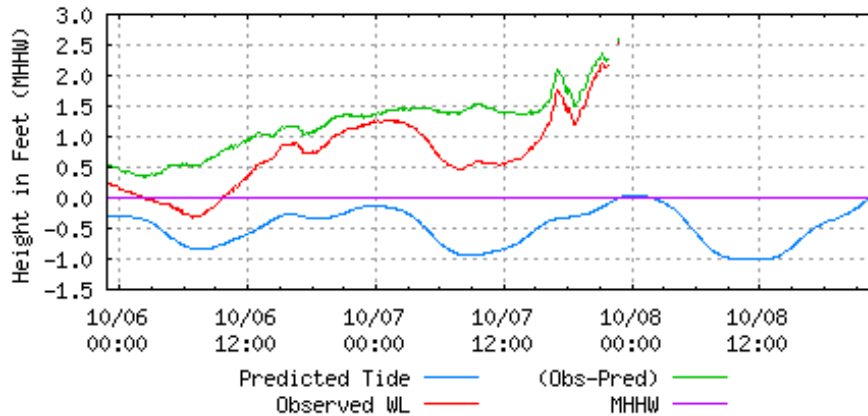


Last Observed Sample: 10/07/2017 22:48 (CDT)

Wind Speed: 17 knots Gusts: 28 knots Direction: 126° T

NOAA/NOS/CO-OPS 8732828 Weeks Bay, Mobile Bay, AL

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 10/07/2017 21:48 (CDT). Data relative to MHHW

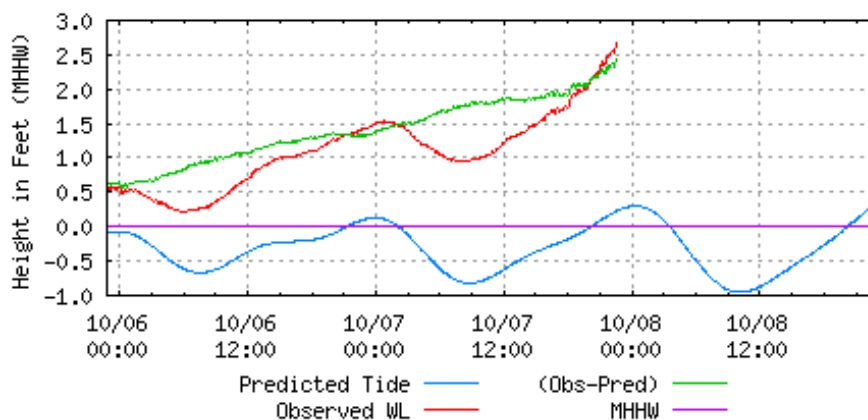
Observed: 2.16 ft. Predicted: -0.09 ft. Residual: 2.25 ft.

Historical Maximum Water Level: Aug 29 2012, 2.85 ft.

Next High Tide: 10/08/2017 00:10 (CDT), 0.04 ft.

NOAA/NOS/CO-OPS 8729840 Pensacola, FL

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



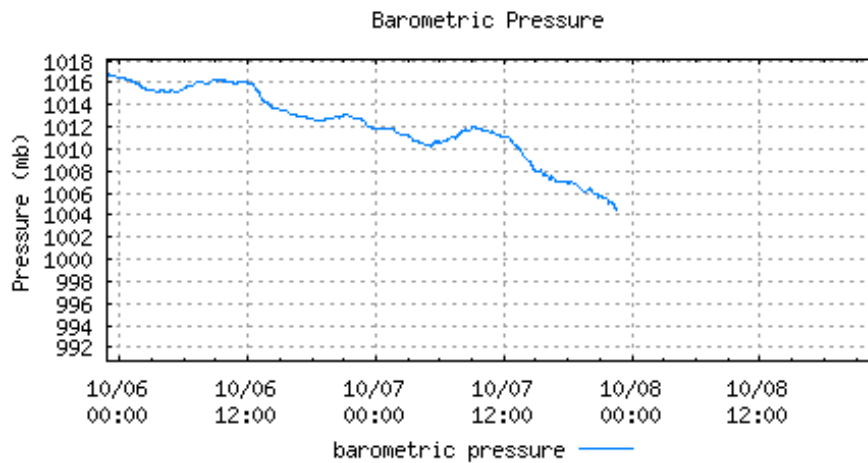
Last Observed Sample: 10/07/2017 22:42 (CDT). Data relative to MHHW

Observed: 2.70 ft. Predicted: 0.23 ft. Residual: 2.47 ft.

Historical Maximum Water Level: Sep 18 1926, 7.41 ft.

Next High Tide: 10/08/2017 00:19 (CDT), 0.30 ft.

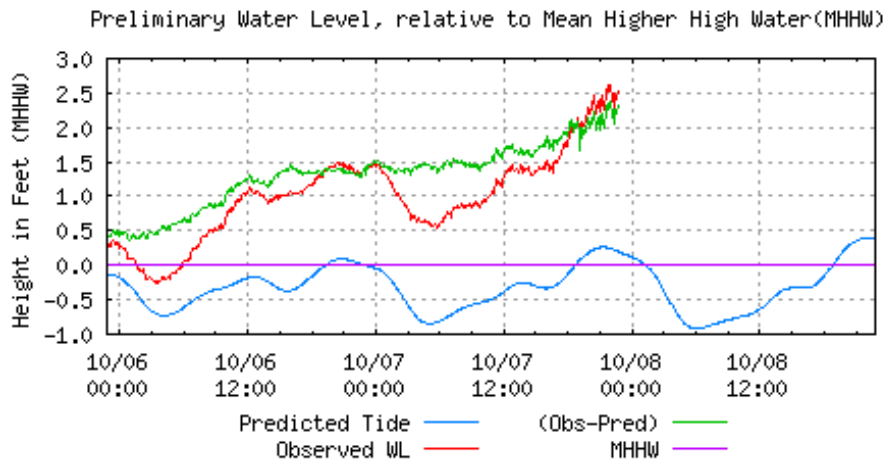
NOAA/NOS/CO-OPS 8729840 Pensacola, FL



Last Observed Sample: 10/07/2017 22:42 (CDT)

Barometric Pressure: 1004.0 mb

NOAA/NOS/CO-OPS 8729210 Panama City Beach, FL



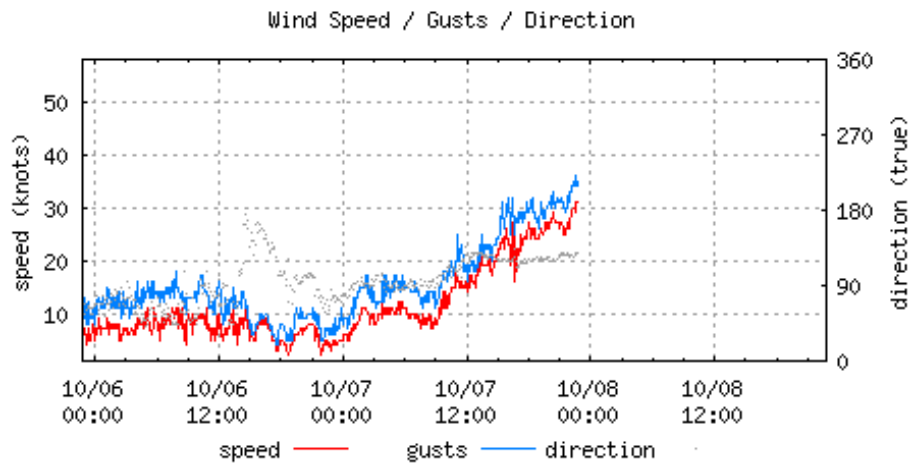
Last Observed Sample: 10/07/2017 22:48 (CDT). Data relative to MHHW

Observed: 2.56 ft. Predicted: 0.19 ft. Residual: 2.37 ft.

Historical Maximum Water Level: Oct 4 1995, 6.84 ft.

Next High Tide: 10/08/2017 22:00 (CDT), 0.40 ft.

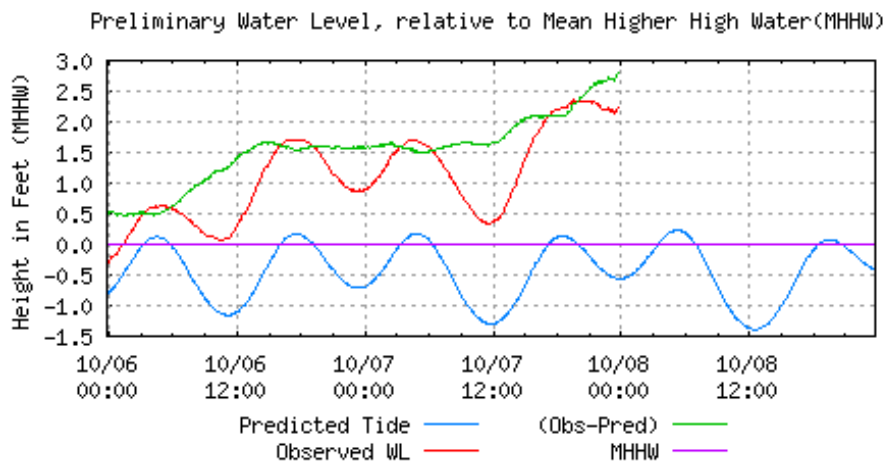
NOAA/NOS/CO-OPS 8729210 Panama City Beach, FL



Last Observed Sample: 10/07/2017 22:48 (CDT)

Wind Speed: 30 knots Gusts: 35 knots Direction: 131° T

NOAA/NOS/CO-OPS 8728690 Apalachicola, FL



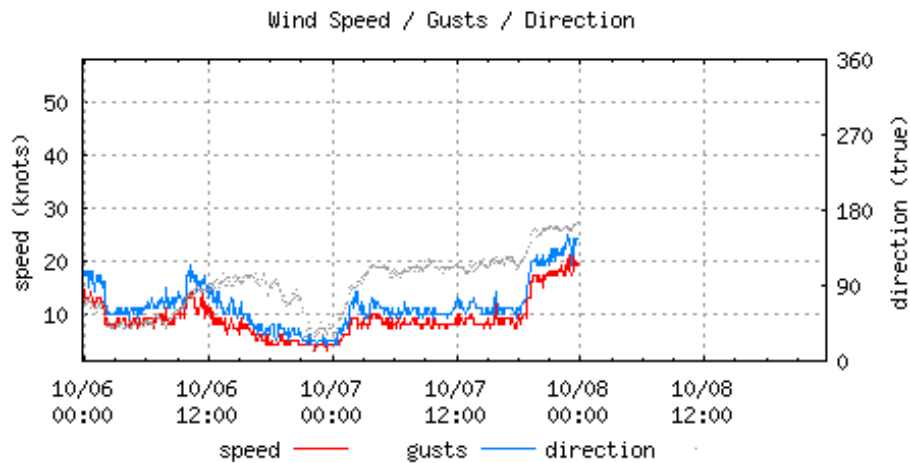
Last Observed Sample: 10/07/2017 23:48 (EDT). Data relative to MHHW

Observed: 2.24 ft. Predicted: -0.56 ft. Residual: 2.80 ft.

Historical Maximum Water Level: Jul 10 2005, 6.43 ft.

Next High Tide: 10/08/2017 05:16 (EDT), 0.23 ft.

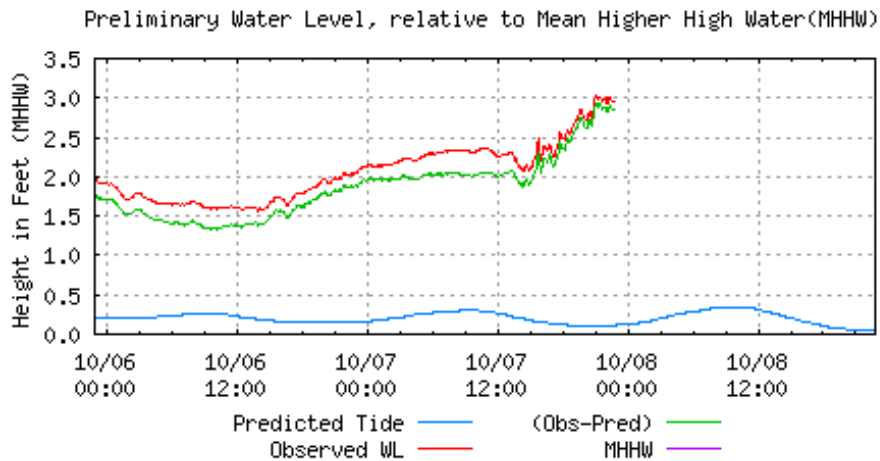
NOAA/NOS/CO-OPS 8728690 Apalachicola, FL



Last Observed Sample: 10/07/2017 23:48 (EDT)

Wind Speed: 19 knots Gusts: 24 knots Direction: 170° T

NOAA/NOS/CO-OPS 8761927 New Canal Station, LA



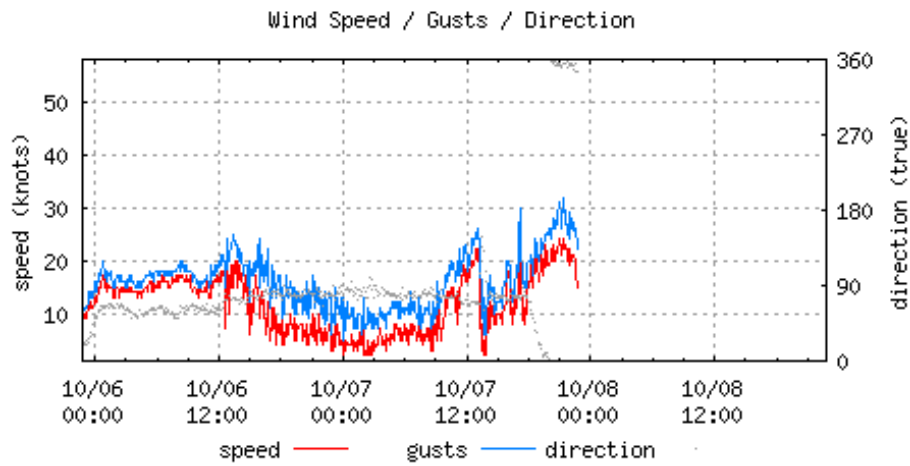
Last Observed Sample: 10/07/2017 22:42 (CDT). Data relative to MHHW

Observed: 2.96 ft. Predicted: 0.11 ft. Residual: 2.85 ft.

Historical Maximum Water Level: Aug 30 2012, 6.03 ft.

Next High Tide: 10/08/2017 09:50 (CDT), 0.35 ft.

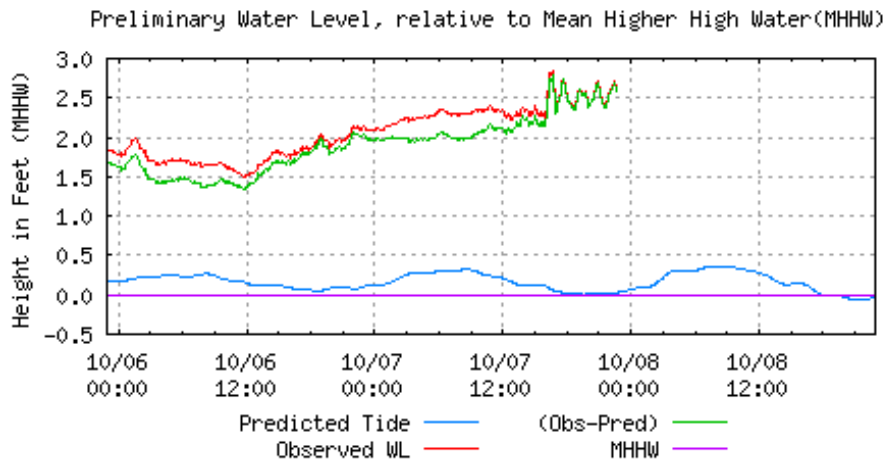
NOAA/NOS/CO-OPS 8761927 New Canal Station, LA



Last Observed Sample: 10/07/2017 22:42 (CDT)

Wind Speed: 15 knots Gusts: 22 knots Direction: 346° T

NOAA/NOS/CO-OPS 8762483 I-10 Bonnet Carre Floodway, LA



Last Observed Sample: 10/07/2017 22:42 (CDT). Data relative to MHHW

Observed: 2.60 ft. Predicted: 0.02 ft. Residual: 2.58 ft.

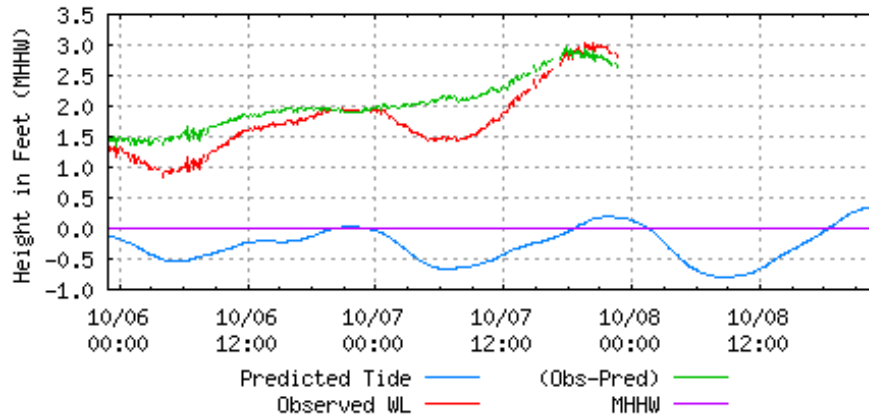
Historical Maximum Water Level: n/a

Next High Tide: 10/08/2017 07:55 (CDT), 0.36 ft.



NOAA/NOS/CO-OPS 8760922 Pilots Station East, SW Pass, LA

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 10/07/2017 22:48 (CDT). Data relative to MHHW

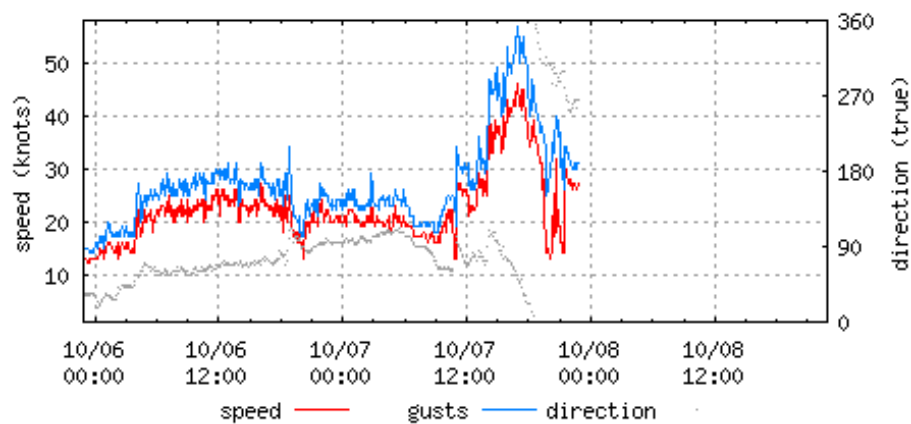
Observed: 2.80 ft. Predicted: 0.18 ft. Residual: 2.62 ft.

Historical Maximum Water Level: Aug 29 2005, 5.98 ft.

Next High Tide: 10/08/2017 22:23 (CDT), 0.33 ft.

NOAA/NOS/CO-OPS 8760922 Pilots Station East, SW Pass, LA

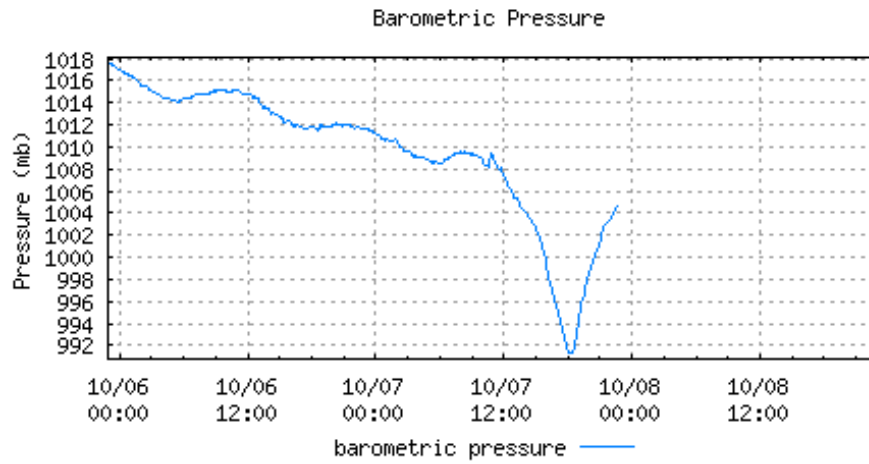
Wind Speed / Gusts / Direction



Last Observed Sample: 10/07/2017 22:48 (CDT)

Wind Speed: 27 knots Gusts: 31 knots Direction: 265° T

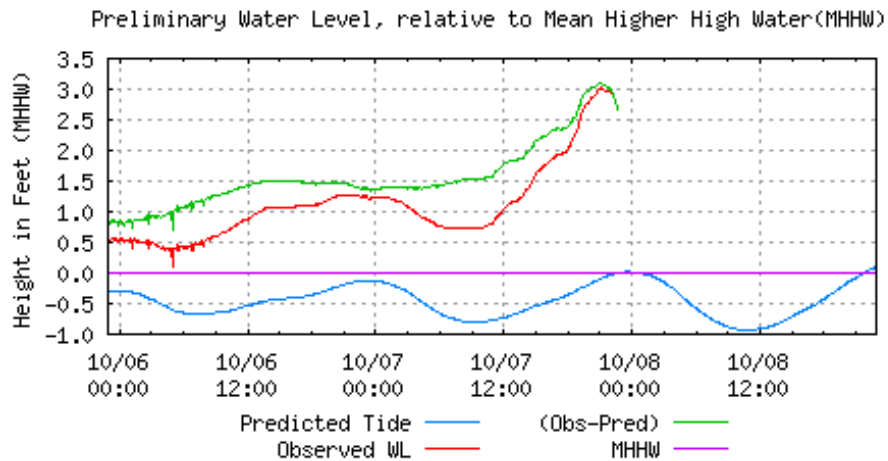
NOAA/NOS/CO-OPS 8760922 Pilots Station East, SW Pass, LA



Last Observed Sample: 10/07/2017 22:48 (CDT)

Barometric Pressure: 1004.7 mb

NOAA/NOS/CO-OPS 8760721 Pilottown, LA



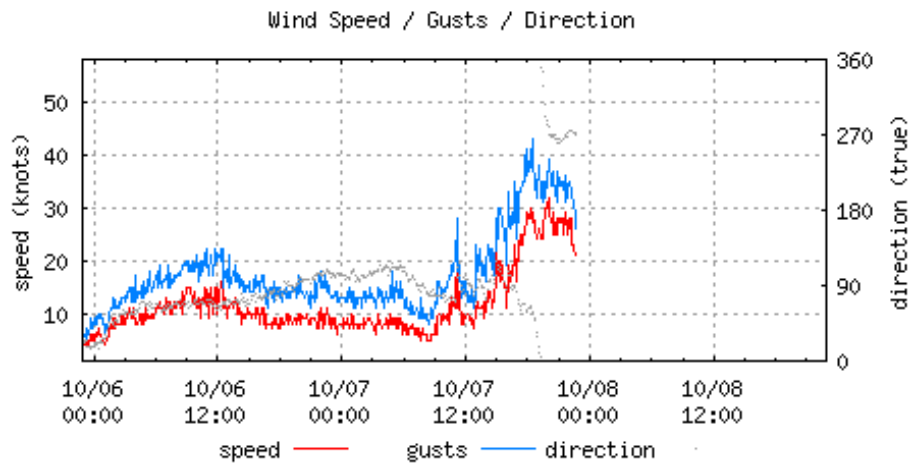
Last Observed Sample: 10/07/2017 22:48 (CDT). Data relative to MHHW

Observed: 2.61 ft. Predicted: 0.00 ft. Residual: 2.61 ft.

Historical Maximum Water Level: n/a

Next High Tide: 10/07/2017 23:36 (CDT), 0.02 ft.

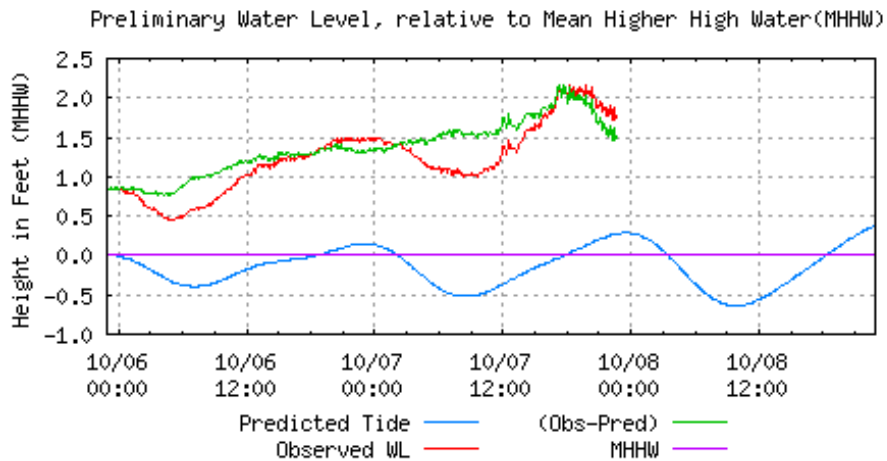
NOAA/NOS/CO-OPS 8760721 Pilottown, LA



Last Observed Sample: 10/07/2017 22:48 (CDT)

Wind Speed: 21 knots Gusts: 26 knots Direction: 268° T

NOAA/NOS/CO-OPS 8761724 Grand Isle, LA



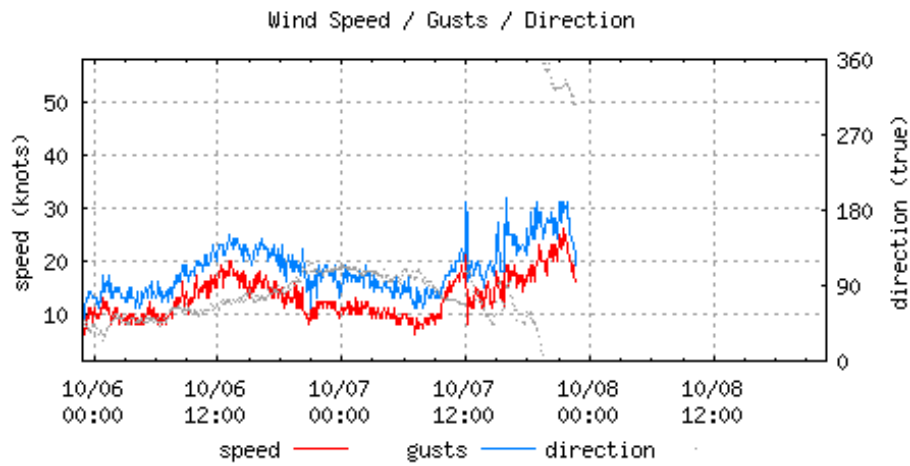
Last Observed Sample: 10/07/2017 22:48 (CDT). Data relative to MHHW

Observed: 1.78 ft. Predicted: 0.28 ft. Residual: 1.50 ft.

Historical Maximum Water Level: Aug 29 2012, 4.45 ft.

Next High Tide: 10/07/2017 23:31 (CDT), 0.29 ft.

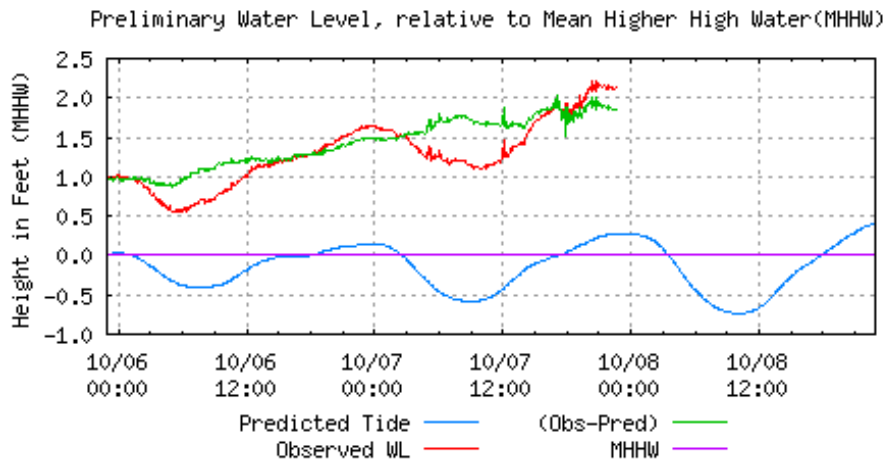
NOAA/NOS/CO-OPS 8761724 Grand Isle, LA



Last Observed Sample: 10/07/2017 22:48 (CDT)

Wind Speed: 17 knots Gusts: 21 knots Direction: 291° T

NOAA/NOS/CO-OPS 8762075 Port Fourchon, Belle Pass, LA



Last Observed Sample: 10/07/2017 22:48 (CDT). Data relative to MHHW

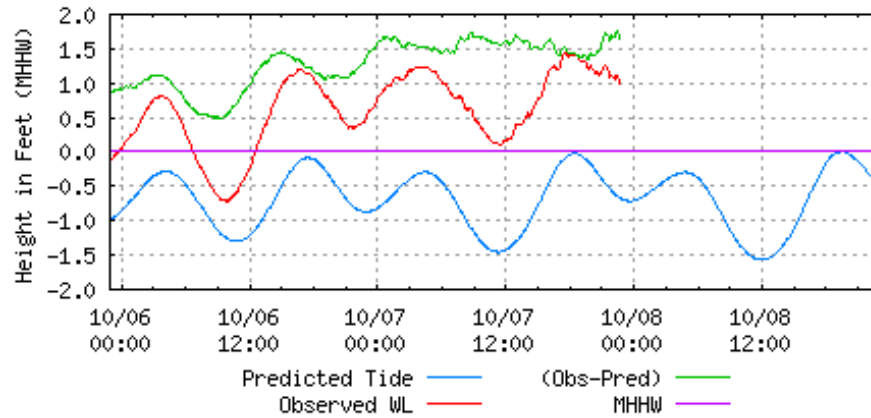
Observed: 2.11 ft. Predicted: 0.28 ft. Residual: 1.83 ft.

Historical Maximum Water Level: Sep 24 2005, 3.70 ft.

Next High Tide: 10/07/2017 23:09 (CDT), 0.28 ft.

NOAA/NOS/CO-OPS 8764227 LAWMA, Amerada Pass, LA

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 10/07/2017 22:48 (CDT). Data relative to MHHW

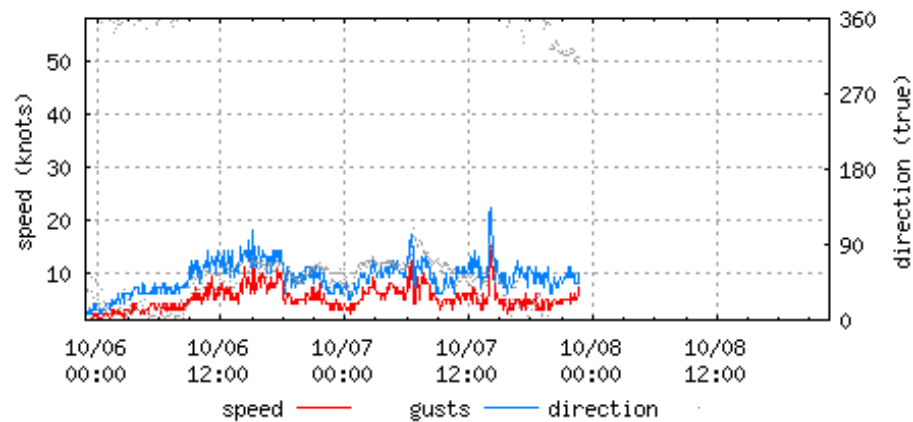
Observed: 0.96 ft. Predicted: -0.68 ft. Residual: 1.64 ft.

Historical Maximum Water Level: Sep 12 2008, 5.94 ft.

Next High Tide: 10/08/2017 04:46 (CDT), -0.29 ft.

NOAA/NOS/CO-OPS 8764227 LAWMA, Amerada Pass, LA

Wind Speed / Gusts / Direction



Last Observed Sample: 10/07/2017 22:48 (CDT)

Wind Speed: 6 knots Gusts: 11 knots Direction: 305° T

Latest Water Level Observations on MHHW

Station ID	Station Name	Date/Time	Observed Water Level	Predicted Tide	Residual Water Level	24 Hour Maximum Storm Tide
8761305	Shell Beach, LA	10/07/2017 22:42 (CDT)	4.74 ft	0.03 ft	4.71 ft	4.82 ft
8747437	Bay Waveland Yacht Club, MS	10/07/2017 22:42 (CDT)	3.47 ft	0.00 ft	3.47 ft	3.47 ft
8739803	Bayou La Batre Bridge, AL	10/07/2017 22:48 (CDT)	3.99 ft	0.27 ft	3.72 ft	3.99 ft
8735180	Dauphin Island, AL	10/07/2017 22:42 (CDT)	2.67 ft	0.26 ft	2.41 ft	3.10 ft
8735523	East Fowl River Bridge, AL	10/07/2017 22:42 (CDT)	3.37 ft	0.06 ft	3.31 ft	3.37 ft
8736897	Coast Guard Sector Mobile, AL	10/07/2017 22:48 (CDT)	3.16 ft	-0.40 ft	3.56 ft	3.43 ft
8732828	Weeks Bay, Mobile Bay, AL	10/07/2017 21:48 (CDT)	2.16 ft	-0.09 ft	2.25 ft	2.20 ft
8729840	Pensacola, FL	10/07/2017 22:42 (CDT)	2.70 ft	0.23 ft	2.47 ft	2.70 ft
8729210	Panama City Beach, FL	10/07/2017 22:48 (CDT)	2.56 ft	0.19 ft	2.37 ft	2.61 ft
8728690	Apalachicola, FL	10/07/2017 23:48 (EDT)	2.24 ft	-0.56 ft	2.80 ft	2.36 ft
8761927	New Canal Station, LA	10/07/2017 22:42 (CDT)	2.96 ft	0.11 ft	2.85 ft	3.03 ft
8762483	I-10 Bonnet Carre Floodway, LA	10/07/2017 22:42 (CDT)	2.60 ft	0.02 ft	2.58 ft	2.85 ft
8760922	Pilots Station East, SW Pass, LA	10/07/2017 22:48 (CDT)	2.80 ft	0.18 ft	2.62 ft	3.04 ft
8760721	Pilottown, LA	10/07/2017 22:48 (CDT)	2.61 ft	0.00 ft	2.61 ft	3.02 ft
8761724	Grand Isle, LA	10/07/2017 22:48 (CDT)	1.78 ft	0.28 ft	1.50 ft	2.16 ft
8762075	Port Fourchon, Belle Pass, LA	10/07/2017 22:48 (CDT)	2.11 ft	0.28 ft	1.83 ft	2.21 ft
8764227	LAWMA, Amerada Pass, LA	10/07/2017 22:48 (CDT)	0.96 ft	-0.68 ft	1.64 ft	1.43 ft

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